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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/186,450	11/05/1998	ALAN H. KARP	10980759	1805

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EXAMINER

HO, THE T

ART UNIT	PAPER NUMBER
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2151

DATE MAILED: 04/26/2002

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Please find below and/or attached an Office communication concerning this application or proceeding.

82

Office Action Summary

Application No.

09/186,450

Applicant(s)

KARP ET AL.

Examiner

The T. Ho

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-35 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-35 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. ____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). ____
- 2) ☒ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) ____ 6) ☐ Other: ____

DETAILED ACTION

1. Claims 1-35 have been examined and are pending in the application.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1-4, 7-8, 12-15, 20-22, 24-26, and 30-31 are rejected under 35 U.S.C. 102(b) as being unpatentable by Hashimoto U.S Patent No. 5,603,020.

As to claim 1, Hashimoto discloses a system as claimed. The system comprises task-specific name space (task-to-file correspondence management tables 5, and 29, Fig. 8) which corresponds (receipt of a request to acquire a directory, line 56 column 10) to a task executing (8, application program task A, Fig. 8) in the software system (operating system, Fig. 8), the task specific name space (task-to-file correspondence management tables 5, and 29, Fig. 8) holding a flexible binding (a new entry storing a pointer, line 60 column 10) that binds (directly points to, line 59 column 10) a task-specific name (1 of task management table 6, Fig. 8) used by the task (task 8, Fig. 8) to refer (obtaining, line 51 column 10) to a desired resource to a set of one or more resources (a directory, line 56 column 10) of the computer system and to a set of information (7, file descriptor management table, Fig. 8) that describes (is specified, line 65 column 10) the desired resource (the file, line 65 column 10); resource mediator

(task management table 6, Fig. 8) that obtains a message (arrows from application program 8 to task management table 6, Fig. 8) from the task (8, application program task A, Fig. 8) which contains the task-specific name (1 of task management table 6, Fig. 8) such that the resource mediator (task management table 6, Fig. 8) identifies a resource handler task (4, file management table, Fig. 8) for the desired resource by resolving (arrows from task management table 6 to task-to-file correspondence management tables 5, and 29, Fig. 8) the task-specific name (1 of task management table 6, Fig. 8) using the flexible binding (a new entry storing a pointer, line 60 column 10).

As to claim 22, note the discussion of claim 1 above.

As to claim 2, Hashimoto further teaches the flexible binding includes a reference (28, directory-oriented file management table, Fig. 8) to a resource descriptor in a repository (task management table 6, Fig. 8) of the software system (operating system, Fig. 8) for each of the one or more resources (a directory, line 56 column 10).

As to claim 24, note the discussions of claims 1, and 2.

As to claim 3, Hashimoto further teaches flexible binding (a new entry storing a pointer, line 60 column 10) includes a binding-type indicator (i node number, line 66 column 10) that informs (request to acquire, line 56 column 10) the resource mediator (task management table 6, Fig. 8) to use the information (7, file descriptor management table, Fig. 8) when resolving the task-specific name.

As to claim 4, Hashimoto further teaches the message (arrows from application program 8 to task management table 6, Fig. 8) includes a binding-type indicator (i node

number, line 66 column 10) that informs the resource mediator (task management table 6, Fig. 8) to use the information (7, file descriptor management table, Fig. 8) when resolving the task-specific name.

As to claim 7, Hashimoto further teaches the binding-type indicator (i node number, line 66 column 10) causes the resource mediator (task management table 6, Fig. 8) to use a flexible binding (S37, Fig. 9) when resolving (to obtain, S37 Fig. 9) the task specific name (S36, Fig. 9) by searching the repository (S38, Fig. 9) for a resource descriptor (file name, S39 Fig. 9) having a set of attributes (file name relative to directory, S39 Fig. 9) that match (corresponding, S39 Fig. 9) the information that describes the desired resource (S. 39, Fig. 9).

As to claim 25, note the discussion of claim 7.

As to claim 8, Hashimoto further teaches the binding-type indicator (i node number, line 66 column 10) causes the resource mediator (task management table 6, Fig. 8) to use a flexible binding (S37, Fig. 9) to update (S42, and S43, Fig. 11) the references when resolving (to obtain, S37 Fig. 9) the task-specific name (S36, Fig. 9) by searching the repository (S38, Fig. 9) for a resource descriptor (file name, S39 Fig. 9) having a set of attributes (file name relative to directory, S39 Fig. 9) that match (corresponding, S39 Fig. 9) the information that describes the desired resource (S. 39, Fig. 9).

As to claim 26, note the discussions of claims 7, and 8.

As to claim 12, Hashimoto further teaches the message includes a primary resource field that holds the task-specific name (1 of task management table 6, Fig. 8)

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for the desired resource and a set of additional resource fields each of which holds a task-specific name (2 of task management table 6, Fig. 8) that the task uses to refer to an additional resource.

As to claim 30, note the discussion of claim 12.

As to claim 13, Hashimoto further teaches primary resource field (1 of task management table 6, Fig. 8) and each additional resource field (2 of task management table 6, Fig. 8) includes a field for holding a task-specific name (task-to-file correspondence management tables 5, and 29, Fig. 8).

As to claim 14, Hashimoto further teaches the resource handler (4, file management table, Fig. 8) uses a default name space (task-to-file correspondence management tables 5, and 29, Fig. 8) associated with the task to resolve the task-specific names in the primary resource (1 of task management table 6, Fig. 8) and additional resource fields (2 of task management table 6, Fig. 8).

As to claim 31, note the discussion of claim 14.

As to claim 15, Hashimoto further teaches the primary resource field (1 of task management table 6, Fig. 8) includes a binding-type indicator (i node number, line 66 column 10) that informs (request to acquire, line 56 column 10) the resource mediator (task management table 6, Fig. 8) of how to resolve (detection procedure, line 55 column 10) the task-specific name in the primary resource field (1 of task management table 6, Fig. 8).

As to claim 20, note the discussion of claim 2. Moreover, Hashimoto further teaches the message (arrows from task 8 to operating system task management table

6, Fig. 13) specifies a repository view (8, task A Fig. 13) that holds a subset of resource descriptors (open /a/b/d/e/x, file descriptor Fig. 13).

As to claim 21, note the discussions of claims 16, and 20.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 5-6, 23, and 35 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hashimoto as applied to claim 4 above, and further in view of Govett U.S Patent No. 5,761,507.

As to claim 5, while Hashimoto disclosed a system as claimed, he does not teach the use of tight binding to resolve the task specific name. Govett teaches the use of tight binding (results in tight binding, line 36 column 5) to resolve the task specific name (connections to plural servers, line 35 column 5). It would have been obvious to apply the teachings of Govett to the system of Hashimoto because tight binding will solve the problem when there is more than one of the repository handles is listed.

As to claim 6, note the discussions of claims 3, and 5.

As to claim 23, note the discussions of claims 2, and 6.

As to claim 35, note the discussions of claims 2, 5, and 6.

4. Claims 9, and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hashimoto as applied to claim 4 above, and further in view of Nomura U.S Patent No. 5,790,853.

As to claim 9, while Hashimoto disclosed a system as claimed, he does not teach the resource mediator to remove any of the references that correspond to resources that are not currently available. Nomura teaches a resource state change section (112, Fig. 45) where a resource reference can be changed, added, or deleted (line 43-47 column 24). It would have been obvious to apply the teachings of Nomura to the system of Hashimoto because once the resource is not currently available doing the processing; its reference is no longer needed and can be removed.

As to claim 27, note the discussion of claim 9.

5. Claims 10-11, 16-19, 28-29, and 32-34 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hashimoto as applied to claim 1 above, and further in view of Ji U.S Patent No. 5,623,600.

As to claim 10, while Hashimoto disclosed a system as claimed, he does not teach the resource mediator enables the task to transfer the flexible binding to another task. Ji teaches task to transfer (transfer, line 46 column 7) the flexible binding (commands, line 47 column 7) to another task (server task, line 47 column 7) in the software system. It would have been obvious to apply the teachings of Ji to the system of Hashimoto because this allows the resource mediator to transfer the binding from the first task to the second task to avoid name conflicts as disclosed by Ji (line 29-65 column 7).

As to claim 11, Ji further teaches task to transfer (transfer, line 46 column 7) the flexible binding (commands, line 47 column 7) to another task (server task, line 47 column 7) in the software system along (including, line 48 column 7) with a set of additional flexible bindings (binding, line 48 column 7).

As to claims 28, and 29, note the discussions of claims 10, and 11, respectively.

As to claim 16, Ji further teaches the flexible binding is a partial binding (806, and 808, Fig. 8A) that includes a reference (spawn SMTP daemon, 808 Fig. 8A) to a resource descriptor for a resource associated with a task (812, Fig. 8A) that will complete the partial binding (800, and 818, Fig 8A).

As to claim 17, note the discussion of claim 10.

As to claim 18, note the discussion of claim 10. Moreover, Ji teaches the task to transfer the partial binding to another task in another software system (transferring data out of the protected domain of the network, line 32-33 column 7).

As to claims 32, 33, and 34, note the discussions of claims 16, 17, and 18, respectively.

As to claim 19, Hashimoto as modified further teaches the task-specific name space (task-to-file correspondence management tables 5, and 29, Fig. 8) is arranged as a structured name space with an ordered list of frames (1, and then 2 of task management table 6, Fig. 8).

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Blazo U.S Patent No. 6,272,518 discloses system and method for porting a multithreaded program to a job model.

Bonham U.S Patent No. 6,157,959 discloses method and apparatus for providing portable kernel-mode support for fast interprocess communication.

Nakagawa U.S Patent No. 6,237,058 discloses interrupt load distribution system for shared bus type multiprocessor system and interrupt load distribution method.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to The T. Ho whose telephone number is 703-306-5540.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-3900.

t.h
January 14, 2002



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